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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/825,585	04/04/2001	Sehyun Kim	2550-004	3719

7390 01/05/2004  
John K. Abokhair  
Roberts, Abokhair & Mardula, L.L.C.  
11800 Sunrise Valley Drive  
Suite 1000  
Reston, VA 20191-5302

EXAMINER

WOODWARD, ANA LUCRECIA

ART UNIT PAPER NUMBER

1711

DATE MAILED: 01/05/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

09/825,585

Applicant(s)

KIM, SEHYUN

Examiner

Ana L. Woodward

Art Unit

1711

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --  
Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE three MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 10/3/03
- 2a) ☒ This action is FINAL. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte* Quayle, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-26 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-26 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

## Priority under 35 U.S.C. §§ 119 and 120

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).  
a) ☐ All b) ☐ Some \* c) ☐ None of:  
1. ☐ Certified copies of the priority documents have been received.  
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.  
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).  
\* See the attached detailed Office action for a list of the certified copies not received.
- 13) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.  
a) ☐ The translation of the foreign language provisional application has been received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_

## **DETAILED ACTION**

### ***Election/Restrictions***

1. Claims 1-26 remain generic to a plurality of disclosed patentably distinct species comprising different embodiments of compositions. The election of an ultimate species of composition comprising specific scrap components and specific blending components is requested. Applicant is required under 35 U.S.C. 121 to elect a single disclosed species, even though this requirement is traversed.

Should applicant traverse on the ground that the species are not patentably distinct, applicant should submit evidence or identify such evidence now of record showing the species to be obvious variants or clearly admit on the record that this is the case. In either instance, if the examiner finds one of the inventions unpatentable over the prior art, the evidence or admission may be used in a rejection under 35 U.S.C. 103(a) of the other invention.

### ***Claim Rejections - 35 USC § 112***

2. The following is a quotation of the first paragraph of 35 U.S.C. 112:

The specification shall contain a written description of the invention, and of the manner and process of making and using it, in such full, clear, concise, and exact terms as to enable any person skilled in the art to which it pertains, or with which it is most nearly connected, to make and use the same and shall set forth the best mode contemplated by the inventor of carrying out his invention.

3. Claims 1-26 are rejected under 35 U.S.C. 112, first paragraph, as failing to comply with the written description requirement. The claim(s) contains subject matter which was not described in the specification in such a way as to reasonably convey to one skilled in the relevant art that the inventor(s), at the time the application was filed, had possession of the claimed invention.

The specification, as originally filed, fails to provide express support for the new lower limit of “15%” governing the thermoplastic scrap material and the term “impact” governing the polypropylene polymer. Since no express support can be found for said new limitations, such are deemed NEW MATTER.

4. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

5. Claims 1-26 are rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

As presently recited, no distinction can be seen between the “impact modifier” and “polypropylene polymer” components defining the blending composition. This is particularly so in view of the new term “impact” governing the polypropylene component. Note that the “olefin copolymer” impact modifier comprising ethylene and propylene units reads on the polypropylene with attached ethylene chains.

In claims 1, 10 and 19, “polypropylene **polymer**” (with emphasis) is redundant.

In claims 1 and 10, the terminology “impact polypropylene” is indefinite as to scope and meaning.

In claims 1, 10 and 19, it is unclear if or how the term “further” limits the inorganic composition filler components of the poly(ethylene-co-vinyl acetate).

***Claim Rejections - 35 USC § 102/103***

6. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

7. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

8. Claims 1-3, 5-12 and 14-18 are rejected under 35 U.S.C. 102(b) as anticipated by or, in the alternative, under 35 U.S.C. 103(a) as obvious over Young et al (U.S. 5,852,115).

Young et al disclose a method for preparing high scrap recycle content miscible compositions comprising melt blending polymeric blends comprising thermoplastic scrap material, ethylene vinyl acetate copolymer and compatibilizing agents. In Tables 7, 13, 17 etc. various compositions are exemplified comprising MSL-1 carpet scrap (meeting the presently claimed scrap material), polypropylene (meeting the presently claimed polypropylene component) and modified polypropylene or modified styrene-ethylene/butylene block copolymer (meeting the presently claimed impact modifier).

As presently recited, the claims do not preclude either modified polypropylene or modified styrene/butylenes block copolymer as the “olefin copolymer” impact modifier. It is

maintained that the disclosure of the reference meets the requirements of the present claims both in terms of the types of materials added and their contents. Thus, the compositions of the reference would be expected to meet all the characteristics governing applicants'.

***Claim Rejections - 35 USC § 103***

9. Claims 4 and 13 are rejected under 35 U.S.C. 103(a) as being unpatentable over Young et al (U.S. 5,852,115) described hereinabove.

It would have been obvious to one having ordinary skill in the art to have further added ethylene-vinyl acetate copolymer for its expected additive effect to the above-mentioned reference compositions. This is because the reference explicitly prefers the separate addition of ethylene vinyl acetate copolymer to the scrap material because it provides outstanding toughness and flexibility (column 11, lines 15-20, etc.).

10. Claims 19-26 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. 5,852,115 (Young et al) in view of U.S. 6,306,318 (Ricciardelli et al) or U.S. 6,228,479 (Zegler et al).

Young et al described hereinabove differs in essence from the above-rejected claims in not expressly disclosing the use of plasticizers. The addition of plasticizers to recycled waste polymeric materials is well known in the art as shown by the additional references. Accordingly, it would have been obvious to one having ordinary skill in the art to have added a plasticizer to the recycled waste materials of Young et al for its expected additive effect, absent evidence of unusual or unexpected results.

***Response to Arguments***

11. Applicant's arguments filed October 8, 2003 have been fully considered but they are not persuasive.

As presently recited, the claims do not preclude either modified polypropylene or modified styrene/butylenes block copolymer as the "olefin copolymer" impact modifier. It is maintained that the disclosure of the reference meets the requirements of the present claims both in terms of the types of materials added and their contents. Thus, the compositions of the reference would be expected to meet all the characteristics governing applicants'.

***Conclusion***

12. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

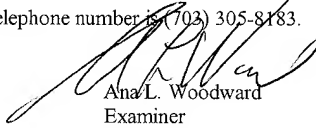
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13. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Ana L. Woodward whose telephone number is (571) 272-1082. The examiner can normally be reached on Monday-Friday (8:30-5:00).

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, James J. Seidleck can be reached on (571) 272-1078. The fax phone number for the organization where this application or proceeding is assigned is (703) 872-9311.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703) 305-8183.



Ana L. Woodward  
Examiner  
Art Unit 1711

AW